



SUPPLEMENTARY EUROPEAN SEARCH REPORT

Application number:
EP 15 88 94 32

Classification of the application (IPC):
G06F 3/041, G06F 3/044, G06F 1/32, G06F 1/3234

Technical fields searched (IPC):
G06F

DOCUMENTS CONSIDERED TO BE RELEVANT		
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim
X	US 2014104208 A1 (LEE JONGOH [KR] ET AL) 17 April 2014 (2014-04-17) * paragraph [0005] - paragraph [0024] * * paragraph [0041] - paragraph [0089] * * figures 5-6 *	1-11
X	US 2014160067 A1 (KIM SUNG CHUL [KR] ET AL) 12 June 2014 (2014-06-12) * paragraph [0003] * * paragraph [0010] - paragraph [0011] * * paragraph [0023] - paragraph [0076] *	1-11
X	US 2013265276 A1 (OBEIDAT AMJAD T [US] ET AL) 10 October 2013 (2013-10-10) * figure 9A * * paragraph [0054] - paragraph [0055] *	1-11
A	US 2014118301 A1 (CHO JIHO [KR] ET AL) 01 May 2014 (2014-05-01) * paragraph [0003] * * paragraph [0011] - paragraph [0013] * * paragraph [0021] - paragraph [0044] *	1, 4, 6, 7, 9
A	US 2015109217 A1 (ZHU ZHIFENG [CN] ET AL) 23 April 2015 (2015-04-23) * paragraph [0005] - paragraph [0008] * * paragraph [0021] * * paragraph [0028] *	2

The supplementary search report has been based on the last set of claims valid and available at the start of the search.

Place of search Berlin	Date of completion of the search 31 January 2019	Examiner Barreiro Megino, A
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CATEGORY OF CITED DOCUMENTS

X: particularly relevant if taken alone	P: intermediate document
Y: particularly relevant if combined with another document of the same category	T: theory or principle underlying the invention
A: technological background	E: earlier patent document, but published on, or after the filing date
O: non-written disclosure	D: document cited in the application
& : member of the same patent family, corresponding document	L: document cited for other reasons

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ANNEX TO SUPPLEMENTARY EUROPEAN SEARCH REPORT

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This annex lists the patent family members relating to the patent documents cited in the above-mentioned European search report. The members are as contained in the European Patent Office EDP file on 31-01-2019
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